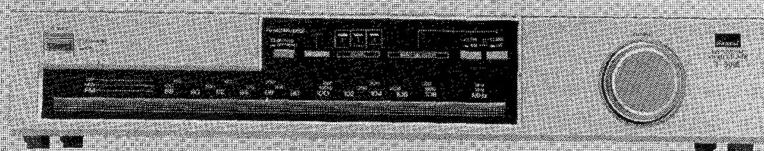


# SERVICE MANUAL

## AM/FM STEREO TUNER SANSUI T-500/500L (Silver & Black Model)



### CAUTION

1. Parts identified by the  $\Delta$  symbol on the schematic diagram and the parts list are critical for safety. Use only replacement parts that have critical characteristics recommended by the manufacturer.
2. Make leakage-current or resistance measurements to determine that exposed parts are acceptably insulated from the supply circuit before returning the appliance to the customer.

**Sansui**

SANSUI ELECTRIC CO., LTD.

### •SPECIFICATIONS

#### T-500

##### FM Section

Tuning range	88 to 108 MHz
Usable sensitivity	
Mono IHF	10.8 dBf (1.9 $\mu$ V: T-100)
DIN	0.9 $\mu$ V
50 dB quieting sensitivity	
Mono	17.0 dBf
Stereo	37.0 dBf
Signal to noise ratio at 65 dBf	
Mono	75 dB
Stereo	70 dB
Distortion at 65 dBf	
Mono	Less than 0.15% at 1,000 Hz
Stereo	Less than 0.2% at 1,000 Hz
Alternate channel selectivity	
(at 400 kHz)	55 dB
Stereo separation	40 dB at 1,000 Hz
Frequency response	30 to 15,000 Hz
	+1.0 dB, -1.5 dB
Antenna input impedance	300 ohms balanced
	75 ohms unbalanced

##### AM Section

Tuning range	530 to 1,600 kHz
Usable sensitivity (Loop antenna)	
	52 dB/m (398 $\mu$ V/m)
Signal to noise ratio	50 dB
Image response ratio	40 dB at 1,000 kHz

##### Others

Output voltage and impedance	0.6V/2.2 kohms
Power requirements	120/220/240V (50/60 Hz)
For U.S.A. and Canada	120V (60 Hz)
Power consumption	8 watts
Dimensions	430 mm (16-15/16") W
	78 mm (3-1/8") H
	233 mm (9-3/16") D
Weight	2.5 kg (5.5 lbs.) net
	3.2 kg (7.1 lbs.) packed

#### T-500L

##### FM Section

Tuning range	88 to 108 MHz
Usable sensitivity	
Mono IHF	10.8 dBf (1.9 $\mu$ V: T-100)
DIN	0.9 $\mu$ V
50 dB quieting sensitivity	
Mono	17.0 dBf
Stereo	37.0 dBf
Signal to noise ratio at 65 dBf	
Mono	75 dB
Stereo	70 dB
Distortion at 65 dBf	
Mono	Less than 0.15% at 1,000 Hz
Stereo	Less than 0.2% at 1,000 Hz
Alternate channel selectivity	
(at 400 kHz)	55 dB
Stereo separation	40 dB at 1,000 Hz
Frequency response	30 to 15,000 Hz
	+1.0 dB, -1.5 dB
Antenna input impedance	300 ohms balanced
	75 ohms unbalanced

##### AM (MW, LW) Section

Tuning range	MW: 530 to 1,600 kHz
	LW: 150 to 350 kHz
Usable sensitivity	MW: 52 dB/m (398 $\mu$ V/m)
	LW: 62 dB/m
Signal to noise ratio	50 dB
Image response ratio	MW: 40 dB at 1,000 kHz
	LW: 40 dB at 250 kHz

##### Others

Output voltage and impedance	0.6V/2.2 kohms
Power requirements	220/240V (50/60 Hz)
Power consumption	8 watts
Dimensions	430 mm (16-15/16") W
	78 mm (3-1/8") H
	233 mm (9-3/16") D
Weight	2.5 kg (5.5 lbs.) net
	3.2 kg (7.1 lbs.) packed

\* Design and specifications subject to changes without notice for improvements.

\* Due to local laws and regulations, this unit sold in some areas are not equipped with variable voltage selectors.

## CAUTION

1. The symbols, UL, CSA, SA, BS, UK, EU, AS, XX <EXPORT> and XX-V <EXPORT(V)> on the parts list and the schematic diagram mean followings respectively.

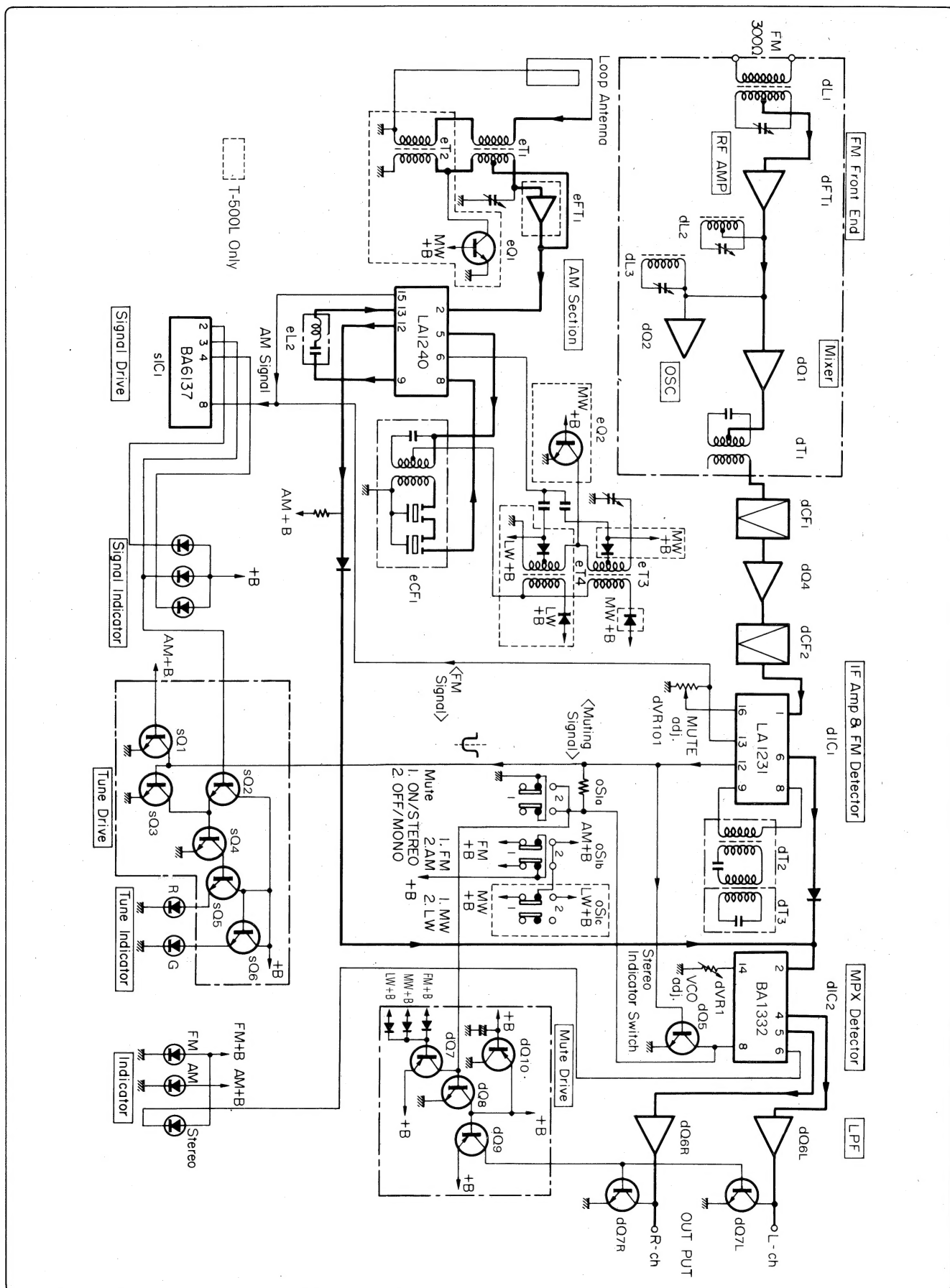
UL.....	Manufactured for U.S.A market. (Underwriters Laboratories approved model.)
CSA .....	Manufactured for Canadian market.
SA.....	Manufactured for South African market.
BS, UK.....	Manufactured for United Kingdom market.
EU .....	Manufactured for European market.
AS.....	Manufactured for Australian market.
XX <EXPORT> .....	Standard Version with Inner Voltage Selector.
XX-V <EXPORT(V)> ....	Standard Version with Outer Voltage Selector.
NON MARK .....	Common Parts.

2. Some printed circuit boards are not supplied as the assembled.  
To separate these in this service manual, the stock No's are not indicated at the ends of the board names. However, the individual parts on the circuit boards are provided by orders.
3. Since some of capacitors and resistors are omitted from parts lists in this service manual, refer to the Common Parts List for capacitors & resistors, which was issued on February 1983.
4. Abbreviations in this service manual are as follows.

### •Abbreviations List

C.R. : Carbon Resistor	E.B.L. : Low Leak Bi-Polar
S.R. : Solid Resistor	Electrolytic Capacitor
Ce.R. : Cement Resistor	Ta.C. : Tantalum Capacitor
M.R. : Metal Film Resistor	F.C. : Film Capacitor
F.R. : Fusing Resistor	M.P. : Metalized Paper Capacitor
N.I.R. : Non-Inflammable Resistor	P.C. : Polystyrene Capacitor
A.R. : Array Resistor	G.C. : Gimmic Capacitor
C.C. : Ceramic Capacitor	A.C. : Array Capacitor
C.T. : Ceramic Capacitor, Temperature Compensation	V.R. : Variable Resistor
E.C. : Electrolytic Capacitor	S.V.R. : Semi Variable Resistor
E.L. : Low Leak Electrolytic Capacitor	SW. : Switch
E.B. : Bi-Polar Electrolytic Capacitor	Chip R. : Chip Resistor
	Chip C. : Chip Capacitor

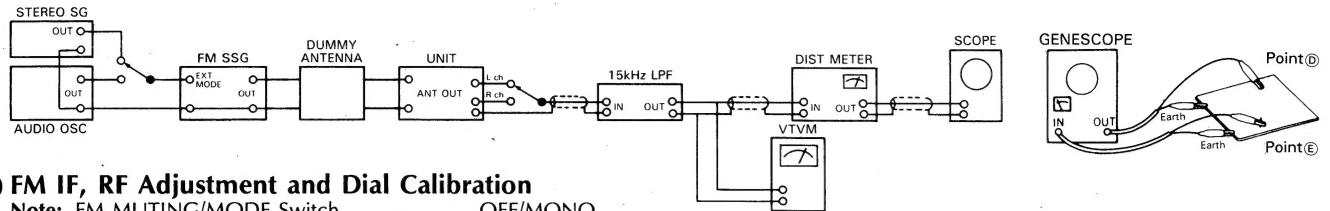
## 1. BLOCK DIAGRAM



## 2. ADJUSTMENTS

### 2-1. FM Adjustment (See Top View on Page 11)

**Note:** BAND SELECTOR..... FM



#### (1) FM IF, RF Adjustment and Dial Calibration

**Note:** FM MUTING/MODE Switch..... OFF/MONO

STEP	SUBJECT	FEED SIGNAL		MEASURE OUTPUT	ADJUST	ADJUST FOR	REMARKS
		FROM	TO				
1.	IF Coil Adj.	98MHz ANT Input 20dBf (14.8dB), 1kHz (100% MOD.), FM SSG	ANT terminal 300Ω	Between Point (A) (dVR101) & Earth DC Volt Meter	dT1 (F-4852)	Max. DC Volt	
2.	Discriminator Coil Adj. In case of using Genescope	1 No Input	—	Between Point (B) & Point (C) (Pin No. 7 & 10 of dIC1) DC Volt Meter •See Parts Location F-4853 on Page 5	dT2 (F-4853)	DC 0V ± 30mV	
		2 Output 80dB, Genescope	Point (D) (dTC2)	Between Point (E) (Pin No.6 of dIC1) & Earth •See Parts Location F-4853 on Page 5	dT3 (F-4853)	Steep linearity of S curve. Make symmetrical S curve.	
	Discriminator Coil Adj. In case of using Dist meter	1 No Input	—	Between Point (B) & Point (C) (Pin No.7 & 10 of dIC1) DC Volt Meter •See Parts Location F-4853 on Page 5	dT2 (F-4853)	DC 0V ± 30mV	<ul style="list-style-type: none"> <li>•Repeat procedures as stated in subject 1 &amp; 2.</li> <li>•Since the dT1 has already adjusted, perform only a fine adjustment in this procedure.</li> </ul>
		2 98MHz ANT Input 65dBf (59.8dB), 1kHz (100% MOD.), FM SSG	ANT terminal 300Ω	OUTPUT L-CH or R-CH VTVM & SCOPE	dT3 (F-4853)	Min. THD	
3.	90MHz Dial Calibration	90MHz ANT Input 65dBf (59.8dB), 1kHz (100% MOD.), FM SSG	Same as above	Dial Pointer OUTPUT L-CH or R-CH VTVM & SCOPE	Tuning Knob dL3 (F-4852)	90MHz Max. Output	<ul style="list-style-type: none"> <li>•Repeat procedures as stated in step 3 &amp; 4.</li> </ul>
4.	106MHz Dial Calibration	106MHz ANT Input 65dBf (59.8dB), 1kHz (100% MOD.), FM SSG	Same as above	Dial Pointer OUTPUT L-CH or R-CH VTVM & SCOPE	Tuning Knob dT3 (F-4852)	106MHz Max. Output	
5.	90MHz RF Adj.	90MHz ANT Input 16dBf (10.8dB) 1000Hz (100% MOD.), FM SSG	Same as above	OUTPUT L-CH or R-CH VTVM & SCOPE	dL1, dL2 (F-4852)	Max. Output	
6.	106MHz RF Adj.	106MHz ANT Input 16dBf (10.8dB) 1000Hz (100% MOD.), FM SSG	Same as above	Same as above	dTC1, dTC2 (F-4852)	Max. Output	



**(2) FM STEREO Adjustment**

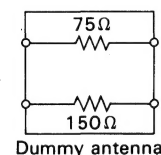
Note: FM Mode..... AUTO

STEP	SUBJECT	FEED SIGNAL		MEASURE OUTPUT	ADJUST	ADJUST FOR	REMARKS
		FROM	TO				
1.	PLL VCO Adj.	98MHz ANT Input 65dBf (59.8dB), FM SSG, Pilot 19kHz (9% MOD.), R or L MODE 1kHz + Pilot (100% MOD.), STEREO SG	ANT terminal 300Ω	Stereo indicator	dVR1 (F-4854)	Light indicator	Adjust the VR within center of lighting level
	PLL VCO Adj. In case of using Freq.	98MHz ANT Input 65dBf (59.8dB), FM SSG, No MOD.	Same as above	Between PointⓅ (dR44) & Earth Freq. counter •See Parts Location F-4854 on Page 5	dVR1 (F-4854)	19kHz ± 25Hz	
2.	Muting level Adj.	98MHz ANT Input 22dBf (16.8dB), FM SSG, Pilot 19kHz (9% MOD.), L or R MODE 1kHz + Pilot (100% MOD.) STEREO SG.	Same as above	Stereo indicator or OUTPUT L-CH or R-CH VTVM & SCOPE	dVR101 (F-4935)	Stereo indicator turns ON or Output Signal comes out	

**◆ ADJUSTMENT FOR FM**

- There are two kind in indication of FM SSG output attenuator
  - Attenuator with marking of 75Ω open..... open indication type.
  - Attenuator with marking of 75Ω load or close..... load or close indication type.
- FM SG output level in this FM adjustment are described as open indication type.
- To feed FM signal, a dummy antenna circuit as Fig. 2-1 must be connected between FM SG output and ANT terminal (300Ω) of the unit.

Fig. 2-1



- The following table shows relations among FM SG attenuator indication (dB), available power ratio (dBf) and antenna terminal voltage (dB/μV) in each indication type.

	FM SG Attenuator Indication	Available Power Ratio	Antenna Terminal Voltage
Open indication type	0 dB 66 dB	−0.8 dBf 65.2 dBf	−6 dB/μV 60 dB/μV
Load or close indication type	0 dB 60 dB	5.2 dBf 65.2 dBf	0 dB/μV 60 dB/μV

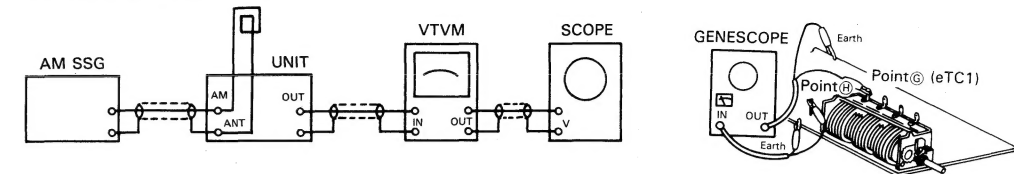
**•Abbreviations**

Equipment  
 AM FM Generator Oscilloscope..... Genescope  
 AM Standard Signal Generator..... AM SSG  
 FM Standard Signal Generator..... FM SSG  
 FM Stereo Generator..... Stereo SG  
 Oscilloscope..... Scope  
 Audio Oscillator..... Audio Osc.  
 Distortion Meter..... Dist. Meter

Others  
 Antenna..... ANT.  
 Modulation..... MOD.  
 Total Harmonic Distortion..... T.H.D.

**2-2. AM Adjustment (See Top View on Page 11)**

- Note: 1. BAND SELECTOR ..... AM  
 2. Connet the AM Loop antenna to the AM antenna terminal and GND terminal.

**(1) AM IF Adjustment & MW AM Dial Calibration**

Note: BAND SELECTOR..... MW

STEP	SUBJECT	FEED SIGNAL		MEASURE OUTPUT	ADJUST	ADJUST FOR	REMARKS
		FROM	TO				
1.	IF Coil Adj.	Genescope Output 60dB	PointⓈ (eTC1)	PointⓈ (Pin No.12 of eIC1) •See Parts Location F-4856 on Page 6	eCF1 eL2 (F-4856)	Max. Wave form	
2.	600kHz Dial Calibration	600kHz ANT Input 60dB 400Hz (30% MOD.) AM SSG	ANT terminal	Dial Pointer	Tuning Knob	600kHz	
				OUTPUT L-CH or R-CH VTVM & SCOPE	eT3 (F-4855 or F-4935 for T-500) (F-4933 for T-500L)	Max. Output	
3.	1400kHz Dial Calibration	1400kHz ANT Input 60dB 400Hz (30% MOD.) AM SSG	Same as above	Dial Pointer	Tuning Knob	1400kHz	
				OUTPUT L-CH or R-CH VTVM & SCOPE	eTC2 (F-4852)	Max. Output	
4.	600kHz RF Adj.	600kHz ANT Input 40dB 400Hz (30% MOD.) AM SSG	Same as above	OUTPUT L-CH or R-CH VTVM & SCOPE	eT1 (F-4855 or F-4935 for T-500) (F-4933 for T-500L)	Max. Output	
5.	1400kHz RF Adj.	1400kHz ANT Input 40dB 400Hz (30% MOD.) AM SSG	Same as above	OUTPUT L-CH or R-CH VTVM & SCOPE	eTC1 (F-4852)	Max. Output	

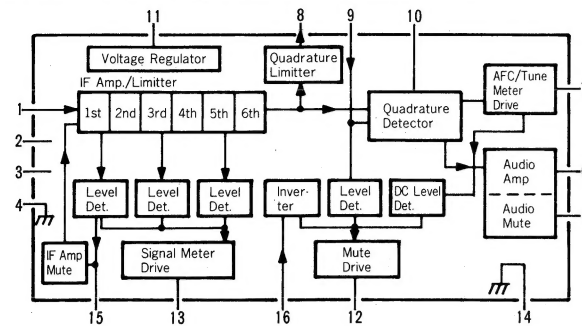
**(2) LW Dial Calibration (T-500L Only)**

Note: BAND SELECTOR..... LW

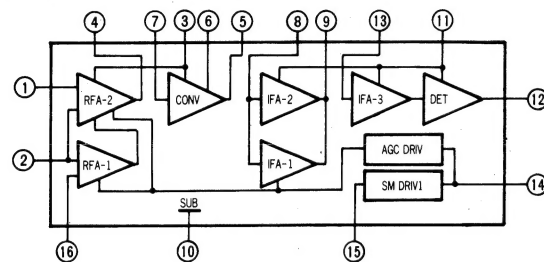
STEP	SUBJECT	FEED SIGNAL		MEASURE OUTPUT	ADJUST	ADJUST FOR	REMARKS
		FROM	TO				
1.	170kHz Dial Calibration	170kHz ANT Input 60dB 400Hz (30% MOD.) AM SSG	ANT terminal	Dial Pointer	Tuning Knob	170kHz	
				OUTPUT L-CH or R-CH VTVM & SCOPE	eT4 (F-4933)	Max. Output	
2.	300kHz Dial Calibration	300kHz ANT Input 60dB 400Hz (30% MOD.) AM SSG	Same as above	Dial Pointer	Tuning Knob	300kHz	
				OUTPUT L-CH or R-CH VTVM & SCOPE	eTC4 (F-4933)	Max. Output	
3.	170kHz RF Adj.	170kHz ANT Input 40dB 400Hz (30% MOD.) AM SSG	Same as above	OUTPUT L-CH or R-CH VTVM & SCOPE	eT2 (F-4933)	Max. Output	
4.	300kHz RF Adj.	300kHz ANT Input 40dB 400Hz (30% MOD.) AM SSG	Same as above	OUTPUT L-CH or R-CH VTVM & SCOPE	eTC3 (F-4933)	Max. Output	

### 3. INTERIOR BLOCK DIAGRAM OF IC

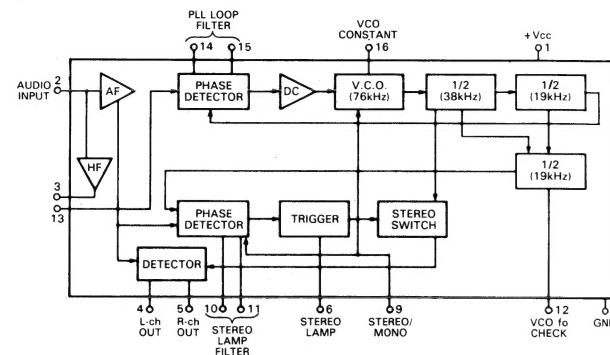
#### •LA1231N (IF & Quadrature Detector IC)



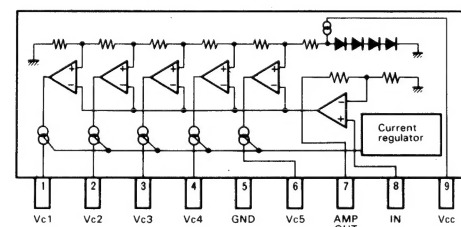
#### •LA1240 (AM Tuner IC)



#### •BA1332 (MPX IC)



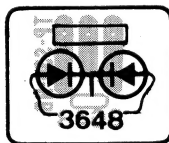
#### •BA6137 (LED Drive IC)



### 4. PARTS LOCATION & PARTS LIST

#### 4-1. F-3648 Dial Pointer LED Board

Component Side

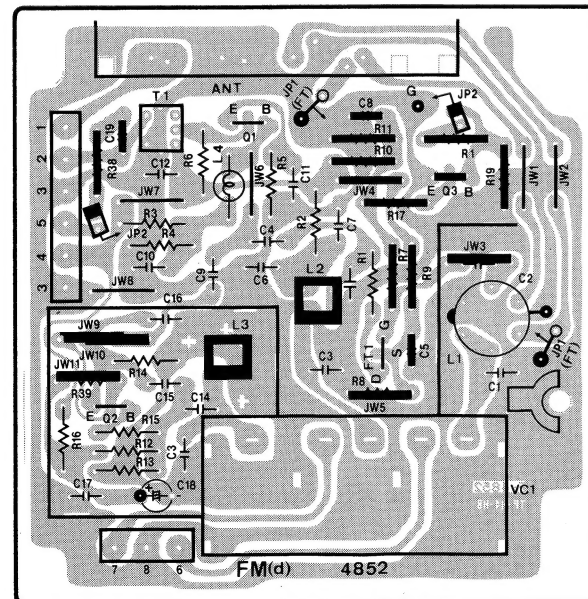


##### Parts List

Parts No.	Stock No.	Description
•LED sLD1	46198900	SLP-520D, Dial Pointer

#### 4-2. F-4852 FM•AM RF Board (Stock No. 00868704 for SA model, Stock No. 00868701 for others)

Component Side

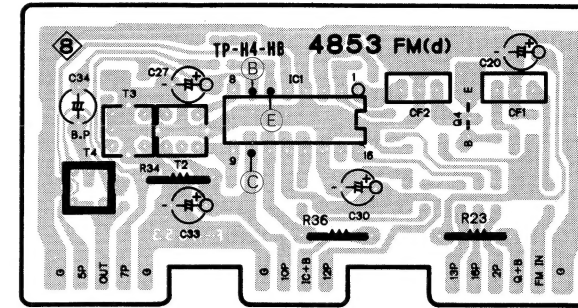


##### Parts List

Parts No.	Stock No.	Description
•Transistor dQ1	46393201	2SC2786
	or 46426701	2SC2999SPA
dQ2	46393101	2SC2839SPA
•FET dFT1	46393000	2SK192A-Y
	or 46393001	2SK192A-GR
ΔdR2	46229000	100Ω 1/2W N.I.R.
dVC1	46369700	Variable Capacitor CR51J519
dL1	42007200	FM RF Coil
dL2	48182100	FM RF Coil
dL3	48182300	FM RF Coil (XX,XX-V,CSA,EU,BS,AS)
	48182400	FM RF Coil (SA)
dL4	48070300	Inductor
dT1	46369500	FM IF Coil
oZ1	46547300	4P Terminal Board, ANTENNA

#### 4-3. F-4853 FM IF Amp. Board (Stock No. 00868801)

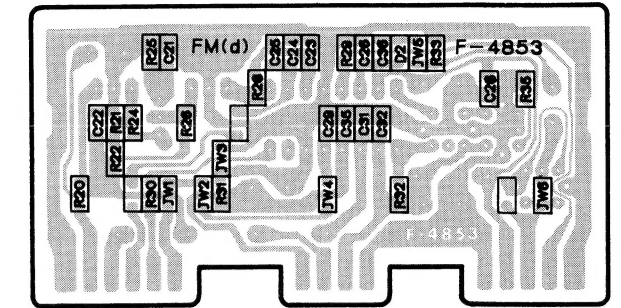
Component Side



##### Parts List

Parts No.	Stock No.	Description
•Transistor dQ4	46393201	2SC2786
•IC dIC1	07191200	LA1231N
•Diode dD2	46852000	RLS-73 (Chip)
dJW1 ~ 6	46741100	Cross Conductor (Chip)
dR20	46745800	180Ω 1/8W Chip R.
dR21	46747000	560Ω 1/8W Chip R.
dR22	46747600	1kΩ 1/8W Chip R.
ΔdR23	46229000	100Ω 1/2W N.I.R.
dR24	46745200	100Ω 1/8W Chip R.
dR25	46747400	820Ω 1/8W Chip R.
dR26	46746600	390Ω 1/8W Chip R.
dR28	46746400	330Ω 1/8W Chip R.
dR29	46752400	100kΩ 1/8W Chip R.
dR30	46750000	10kΩ 1/8W Chip R.
dR31	46751600	47kΩ 1/8W Chip R.

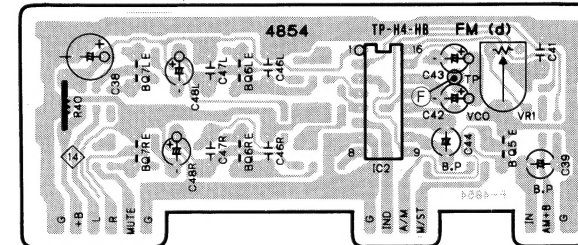
Pattern Side <Chip Parts>



Parts No.	Stock No.	Description
dR32	46750400	15kΩ 1/8W Chip R.
dR33	46752400	100kΩ 1/8W Chip R.
dR35	46748800	3.3kΩ 1/8W Chip R.
ΔdR36	46229000	100Ω 1/2W N.I.R.
dC21	46854500	0.022μF 50V Chip C.
dC22	46854900	0.047μF 50V Chip C.
dC23	46854900	0.047μF 50V Chip C.
dC24	46854900	0.047μF 50V Chip C.
dC25	46854900	0.047μF 50V Chip C.
dC26	46778100	100pF 50V Chip C.
dC28	46854500	0.022μF 50V Chip C.
dC29	46854500	0.022μF 50V Chip C.
dC31	46854900	0.047μF 50V Chip C.
dC32	46854900	0.047μF 50V Chip C.
dC34	48102400	4.7μF 25V E.B.
dCF1	09106410	Ceramic Filter
dCF2	09106410	Ceramic Filter
dT2	48072100	FM IF Coil
dT3	48072200	FM IF Coil

#### 4-4. F-4854 FM MPX Board (Stock No. 00868901)

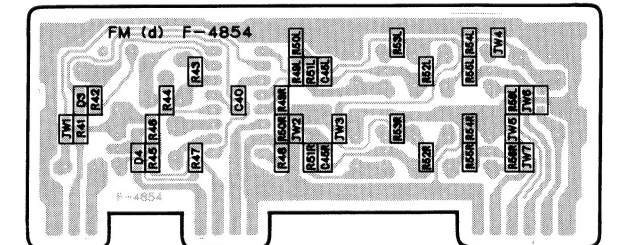
Component Side



##### Parts List

Parts No.	Stock No.	Description
•Transistor dQ5	46367101	2SC2603
	or 46367301	2SC2458
	or 46391901	2SC2785
dQ6	46367101	2SC2603
	or 46367301	2SC2458
	or 46391901	2SC2785
dQ7	46540801	2SC2878
•IC dIC2	48169300	BA1332
•Diode dD3	46852000	RLS-73 (Chip)
dD4	46852000	RLS-73 (Chip)
dJW1 ~ 7	46741100	Cross Conductor (Chip)
ΔdR40	46228200	22Ω 1/2W N.I.R.
dR41	46751200	33kΩ 1/8W Chip R.
dR42	46749800	8.2kΩ 1/8W Chip R.
dR43	46747600	1kΩ 1/8W Chip R.

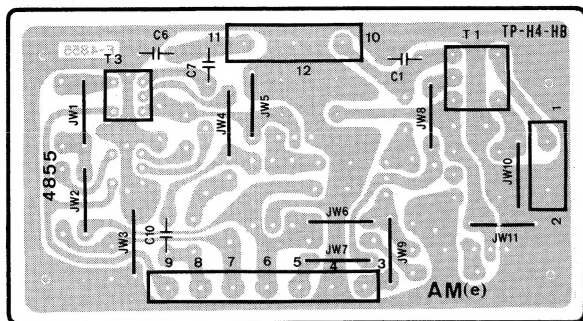
Pattern Side <Chip Parts>



Parts No.	Stock No.	Description
dR44	46750000	10kΩ 1/8W Chip R.
dR45	46750000	10kΩ 1/8W Chip R.
dR46	46749200	4.7kΩ 1/8W Chip R.
dR47	46751600	47kΩ 1/8W Chip R.
dR48	46747400	820Ω 1/8W Chip R.
dR49	46749200	4.7kΩ 1/8W Chip R.
dR50	46748800	3.3kΩ 1/8W Chip R.
dR51	46747600	1kΩ 1/8W Chip R.
dR52	46747200	680Ω 1/8W Chip R.
dR53	46745400	120Ω 1/8W Chip R.
dR54	46752000	68kΩ 1/8W Chip R.
dR55	46747800	1.2kΩ 1/8W Chip R.
dR56	46748800	3.3kΩ 1/8W Chip R.
dC39	48102400	4.7μF 25V E.B.
dC40	46854900	0.047μF 50V Chip C.
dC44	48103400	1μF 50V E.B.
dC45	46778300	120pF 50V Chip C.
dC46	46283100	0.015μF 50V F.C.
dC47	46282800	8200pF 50V F.C.
dVR1	07241200	5kΩ (B) S.V.R., PLL VCO Adj.

**4-5. F-4855 AM RF Board** (Only for T-500 XX & XX-V models)

Component Side

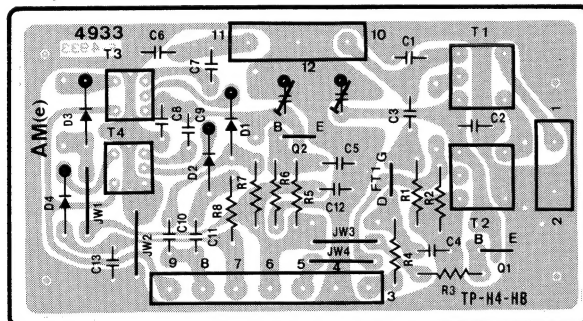


## Parts List

Parts No.	Stock No.	Description
eT1	48178000	AM Antenna Coil
eT3	46369300	AM OSC Coil

**4-6. F-4933 MW•LW RF Board** (Only for T-500L)

Component Side

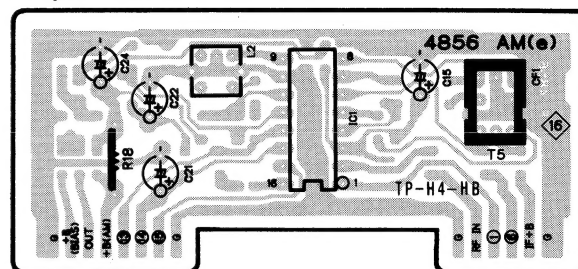


## Parts List

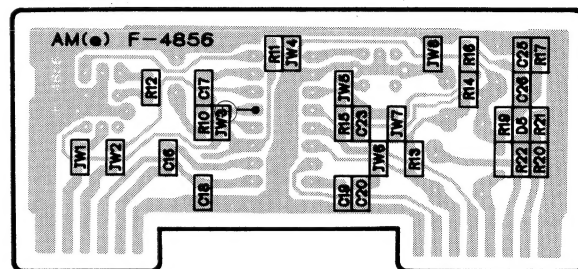
Parts No.	Stock No.	Description
•Transistor		
eQ1	46540801	2SC2878
eQ2	46540801	2SC2878
eFT1	46393000 or 46393001	2SK192A-Y 2SK192A-GR
•Diode		
eD1	46086000 or 03117600	1S1588TP-3 1S2473T77
eD2	46086000 or 03117600	1S1588TP-3 1S2473T77
eD3	46086000 or 03117600	1S1588TP-3 1S2473T77
eD4	46086000 or 03117600	1S1588TP-3 1S2473T77
eTC3	46162800 or 46437400	20pF Trimmer Capacitor 20pF Trimmer Capacitor
eTC4	46162800 or 46437400	20pF Trimmer Capacitor 20pF Trimmer Capacitor
eT1	48178000	MW Antenna Coil
eT2	48178100	LW Antenna Coil
eT3	46369300	MW OSC Coil
eT4	46369400	LW OSC Coil

**4-7. F-4856 AM IF Amp. Board** (Stock No. 00869101)

Component Side



Pattern Side &lt;Chip Parts&gt;

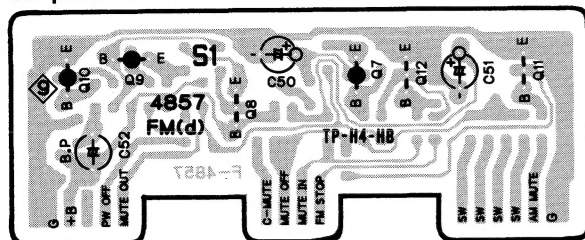


## Parts List

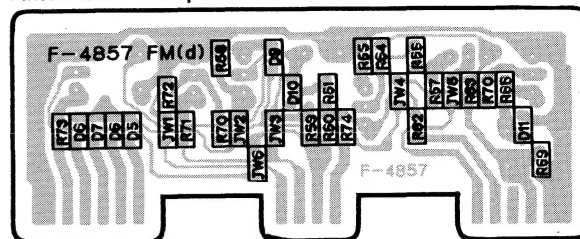
Parts No.	Stock No.	Description
•IC		
eIC1	03608000	LA1240
•Diode		
eD5	46852000	RLS-73 (Chip)
eJW1 ~ 9	46741100	Cross Conductor (Chip)
eR10	46748000	1.5k $\Omega$ 1/8W Chip R.
eR11	46745200	100 $\Omega$ 1/8W Chip R.
eR12	46744400	47 $\Omega$ 1/8W Chip R.
eR13	46750000	10k $\Omega$ 1/8W Chip R.
eR14	46750000	10k $\Omega$ 1/8W Chip R.
eR15	46745200	100 $\Omega$ 1/8W Chip R.
eR16	46747600	1k $\Omega$ 1/8W Chip R.
eR17	46752400	100k $\Omega$ 1/8W Chip R.
eR18	46229000	100 $\Omega$ 1/2W N.I.R.
eR19	46751800	56k $\Omega$ 1/8W Chip R.
eR20	46754400	680k $\Omega$ 1/8W Chip R.
eR21	46753200	220k $\Omega$ 1/8W Chip R.
eR22	46751200	33k $\Omega$ 1/8W Chip R.
eC16	46854500	0.022 $\mu$ F 50V Chip C.
eC17	46854500	0.022 $\mu$ F 50V Chip C.
eC18	46794300	1000pF 50V Chip C.
eC19	46854500	0.022 $\mu$ F 50V Chip C.
eC20	46794300	1000pF 50V Chip C.
eC23	46795500	0.01 $\mu$ F 50V Chip C.
eC25	46794300	1000pF 50V Chip C.
eC26	46854900	0.047 $\mu$ F 50V Chip C.
eCF1	48177700 48177900	Ceramic Filter CFLZ455 (T-500) Ceramic Filter CFLZ455 (T-500L)
eL22	46369600	AM IF Coil
eT5	48177800	AM IFT (T-500L)

#### 4-8. F-4857 FM Muting Board (Stock No. 00869201)

### Component Side



**Pattern Side <Chip Parts>**



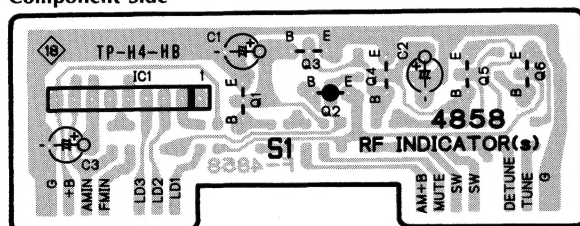
## Parts List

Parts No.	Stock No.	Description
•Transistor		
dQ7	46367001	2SA1115
	or 46367201	2SA1048
	or 46392001	2SA1175
dQ8	46367101	2SC2603
	or 46367301	2SC2458
	or 46391901	2SC2785
dQ9	46367001	2SA1115
	or 46367201	2SA1048
	or 46392001	2SA1175
dQ10	46367001	2SA1115
	or 46367201	2SA1048
	or 46392001	2SA1175
•Diode		
dD5	46852000	RLS-73 (Chip)
dD6	46852000	RLS-73 (Chip)
dD7	46852000	RLS-73 (Chip)
dD9	46852000	RLS-73 (Chip)

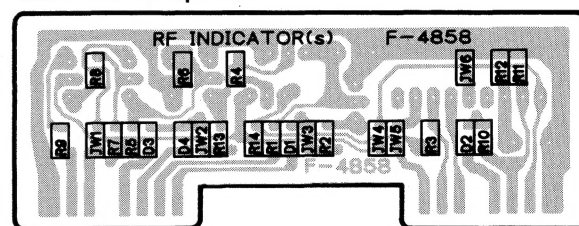
Parts No.	Stock No.	Description
dD10	46852000	RLS-73 (Chip)
dD11	46852000	RLS-73 (Chip)
dJW1 ~ 6	46741100	Cross Conductor (Chip)
dR58	46751600	47k $\Omega$ 1/8W Chip R.
dR59	46750000	10k $\Omega$ 1/8W Chip R.
dR60	46750000	10k $\Omega$ 1/8W Chip R.
dR61	46750800	22k $\Omega$ 1/8W Chip R.
dR62	46750800	22k $\Omega$ 1/8W Chip R.
dR63	46750800	22k $\Omega$ 1/8W Chip R.
dR64	46750800	22k $\Omega$ 1/8W Chip R.
dR65	46745200	100 $\Omega$ 1/8W Chip R.
dR66	46748800	3.3k $\Omega$ 1/8W Chip R.
dR67	46747000	560 $\Omega$ 1/8W Chip R.
dR68	46750000	10k $\Omega$ 1/8W Chip R.
dR69	46751600	47k $\Omega$ 1/8W Chip R.
dR70	46750200	12k $\Omega$ 1/8W Chip R.
dC52	48103400	1 $\mu$ F 50V E.B.

#### 4-9. F-4858 Indicator Control Board (Stock No. 00869301)

### Component Side



**Pattern Side <Chip Parts>**



## Parts List

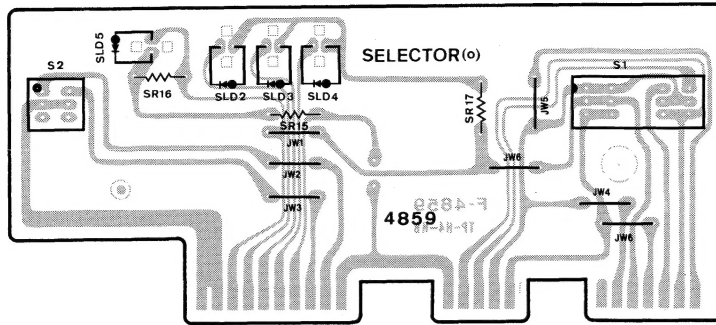
Parts No.	Stock No.	Description
•Transistor		
sQ1	46367101	2SC2603
	or 46367301	2SC2458
	or 46391901	2SC2785
sQ2	46367001	2SA1115
	or 46367201	2SA1048
	or 46392001	2SA1175
sQ3	46367101	2SC2603
	or 46367301	2SC2458
	or 46391901	2SC2785
sQ4	46367101	2SC2603
	or 46367301	2SC2458
	or 46391901	2SC2785
sQ5	46367101	2SC2603
	or 46367301	2SC2458
	or 46391901	2SC2785
sQ6	46367101	2SC2603
	or 46367301	2SC2458
	or 46391901	2SC2785
•IC		
sIC1	46197200	BA6137

Parts No.	Stock No.	Description
•Diode		
sD1	46852000	RLS-73 (Chip)
sD2	46852000	RLS-73 (Chip)
sJW1 ~ 6	46741100	Cross Conductor (Chip)
sR1	46750000	10k $\Omega$ 1/8W Chip R.
sR2	46750800	22k $\Omega$ 1/8W Chip R.
sR3	46750000	10k $\Omega$ 1/8W Chip R.
sR4	46750000	10k $\Omega$ 1/8W Chip R.
sR5	46750000	10k $\Omega$ 1/8W Chip R.
sR6	46752400	100k $\Omega$ 1/8W Chip R.
sR7	46747400	820 $\Omega$ 1/8W Chip R.
sR8	46750000	10k $\Omega$ 1/8W Chip R.
sR9	46747400	820 $\Omega$ 1/8W Chip R.
sR10	46750400	15k $\Omega$ 1/8W Chip R.
sR11	46750000	10k $\Omega$ 1/8W Chip R.
sR12	46750000	10k $\Omega$ 1/8W Chip R.
sR14	46750800	22k $\Omega$ 1/8W Chip R.



## 4-10. F-4859 Selector Board for T-500

Component Side



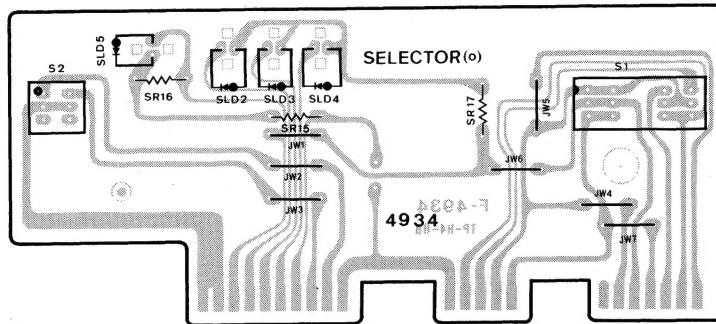
## Parts List

Parts No.	Stock No.	Description
oS1	48169600	Push SW., BAND SELECTOR
oS2	48169400	Push SW., FM MUTING/MODE
•LED sLD2	48185200	GL-3NG87, SIGNAL 1

Parts No.	Stock No.	Description
sLD3	48185200	GL-3NG87, SIGNAL 2
sLD4	48185200	GL-3NG87, SIGNAL 3
sLD5	46176900 or 46470200	TLS-123, STEREO SEL2210S, STEREO

## 4-11. F-4934 Selector Board for T-500L

Component Side



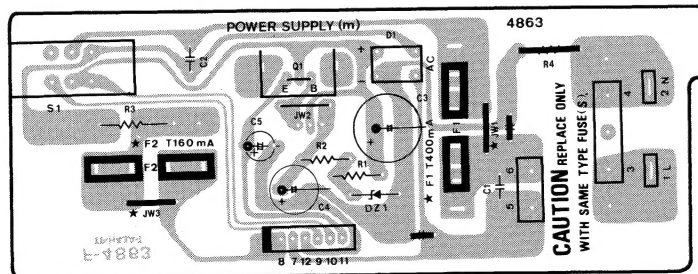
## Parts List

Parts No.	Stock No.	Description
oS1	48169600	Push SW., BAND SELECTOR
oS2	48169400	Push SW., FM MUTING/MODE
•LED sLD2	48185200	GL-3NG87, SIGNAL 1

Parts No.	Stock No.	Description
sLD3	48185200	GL-3NG87, SIGNAL 2
sLD4	48185200	GL-3NG87, SIGNAL 3
sLD5	46176900 or 46470200	TLS-123, STEREO SEL2210S, STEREO

## 4-12. F-4863 Power Supply Board (Stock No. 00869501)

Component Side



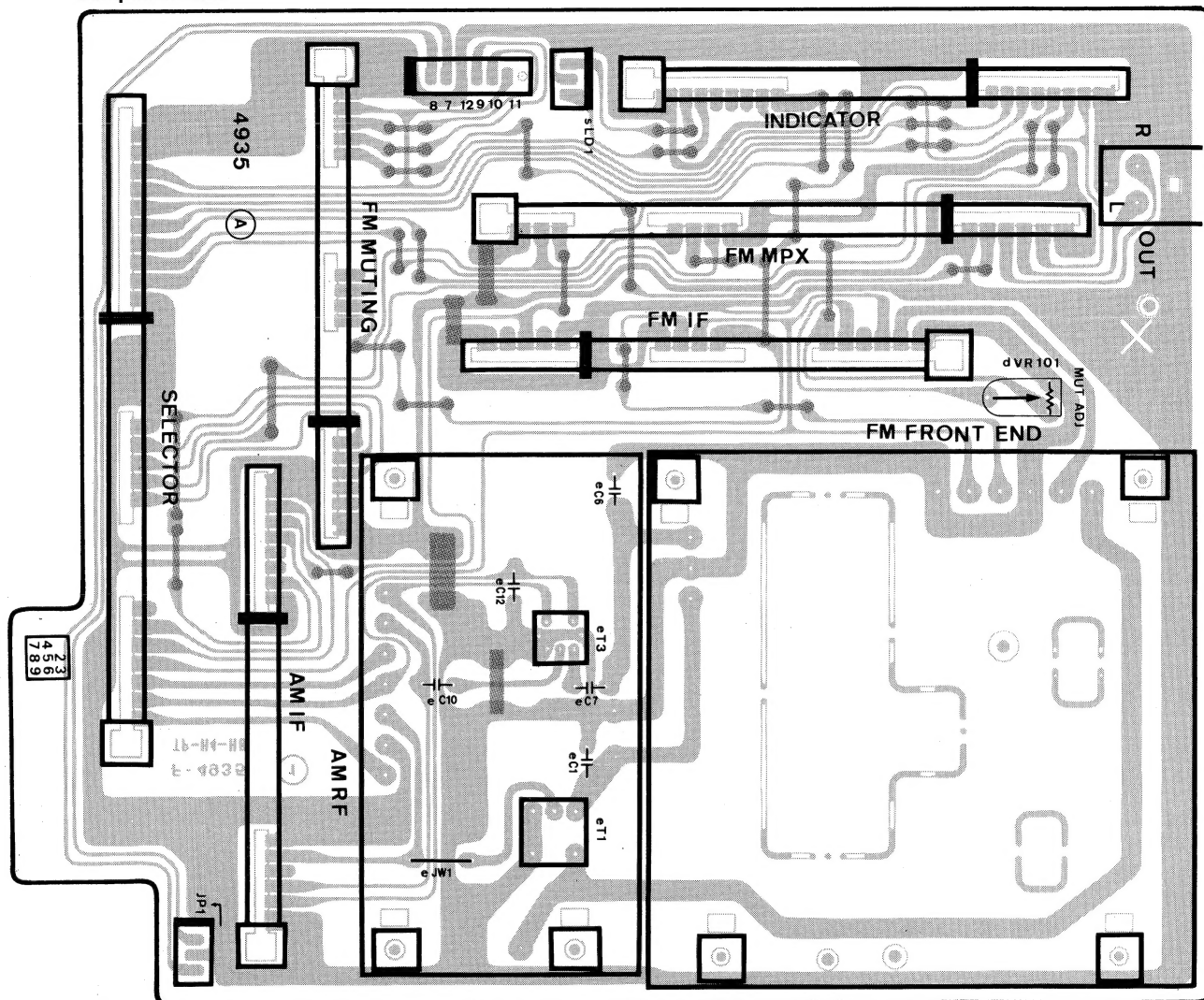
## Parts List

Parts No.	Stock No.	Description
•Transistor ΔmQ1 Δ	03083901 or 46546701	2SD313AL 2SD880
•Diode ΔmD1	46273600	DBB10-B

Parts No.	Stock No.	Description
•Zener Diode mDZ1	46104200	05Z15-X
ΔmR3	00190100	47Ω 2W N.I.R.
ΔmF1	07184300	400mA 250V Fuse (BS)
ΔmS1	48181900	Push SW., POWER

## 4-13. F-4935 Main Wiring Board (Only for unit with F-4855 board)

Component Side

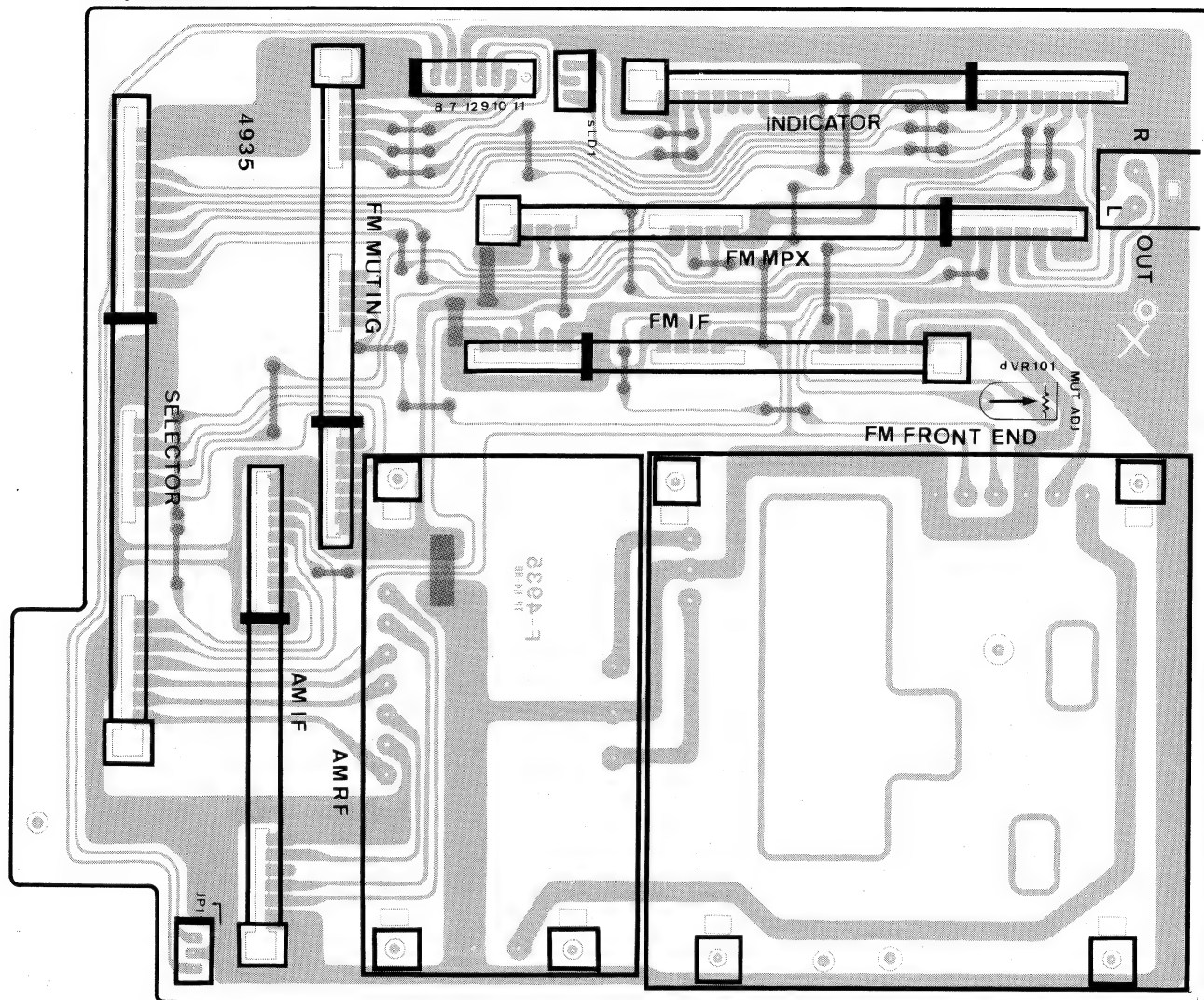


## Parts List

Parts No.	Stock No.	Description
dVR101	07241300	10k $\Omega$ (B) S.V.R., FM Muting Adj.
oZ2	46438100	2P Terminal Board, OUTPUT

#### 4-14. F-4935 Main Wiring Board (Only for unit without F-4855 board)

Component Side

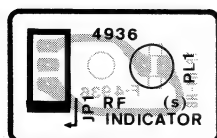


##### Parts List

Parts No.	Stock No.	Description
dVR101	07241300	10k $\Omega$ (B) S.V.R., FM Muting Adj.
eT1	48178000	MW ANT Coil (T-500)
eT3	46369300	AM RF Coil (T-500)
oZ2	46438100	2P Terminal Board, OUTPUT

#### 4-15. F-4936 Dial Illumination Lamp Board

Component Side

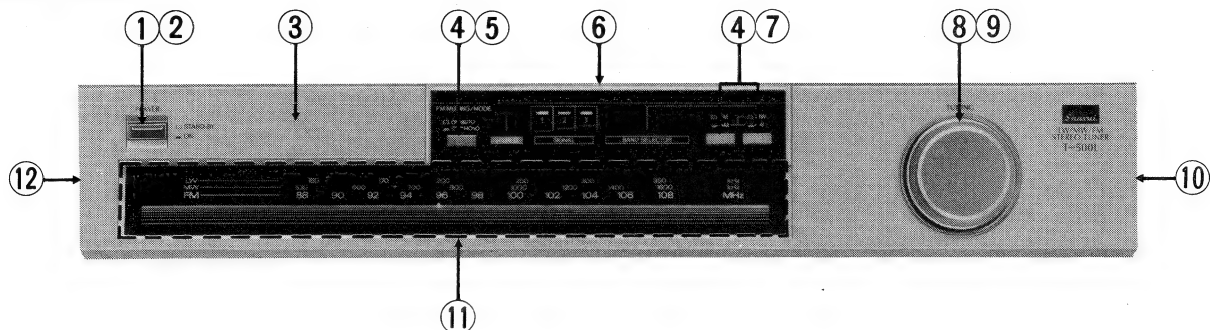


##### Parts List

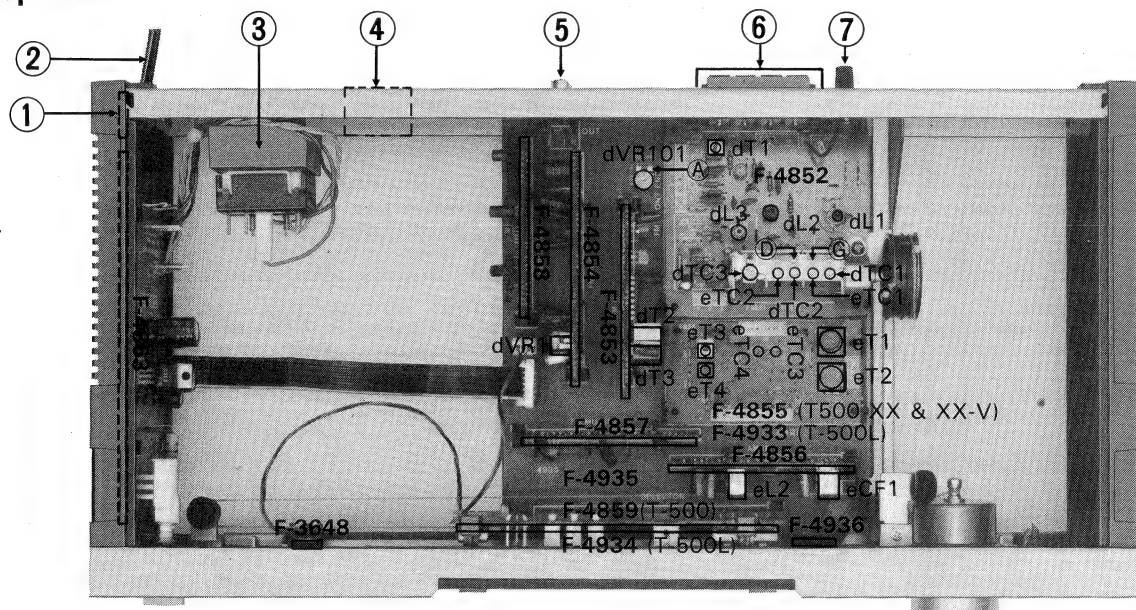
Parts No.	Stock No.	Description
sPL1	48191900	12V 0.15A Pilot Lamp

## 5. OTHER PARTS

### 5-1. Front View



### 5-2. Top View



#### Parts List < Front View >

Parts No.	Stock No.	Description
1	47747000	Knob, POWER (Silver Model)
	47747100	Knob, POWER (Black Model)
△ 2	48181900	Push SW., POWER
3	47845300	Front Panel Ass'y (T-500 Silver Model)
	47845400	Front Panel Ass'y (T-500 Black Model)
	47845500	Front Panel Ass'y (T-500L Silver Model)
	47845600	Front Panel Ass'y (T-500L Black Model)
4	47747200	Knob, FM MUTING/MODE, AM, FM, FM/AM, MW/LW
5	48169400	Push SW., FM MUTING/MODE
6	47854700	Bonnet (Silver Model)
	47872700	Bonnet (Black Model)
7	48169500	Push SW., AM, FM (T-500)
	48169600	Push SW., FM/AM, MW/LW (T-500L)
8	47758400	Knob, TUNING (Silver Model)
	47783800	Knob, TUNING (Black Model)
9	47764800	Tuning Unit
10	47873000	Right Side Panel Ass'y (Silver Model)
	47873100	Right Side Panel Ass'y (Black Model)
11	47758900	Dial Scale (T-500 XX, XX-V, UL, CSA, AS)

Parts No.	Stock No.	Description
	47759000	Dial Scale (T-500 SA)
	47759100	Dial Scale (T-500L)
12	47872800	Left Side Panel Ass'y (Silver Model)
	47872900	Left Side Panel Ass'y (Black Model)

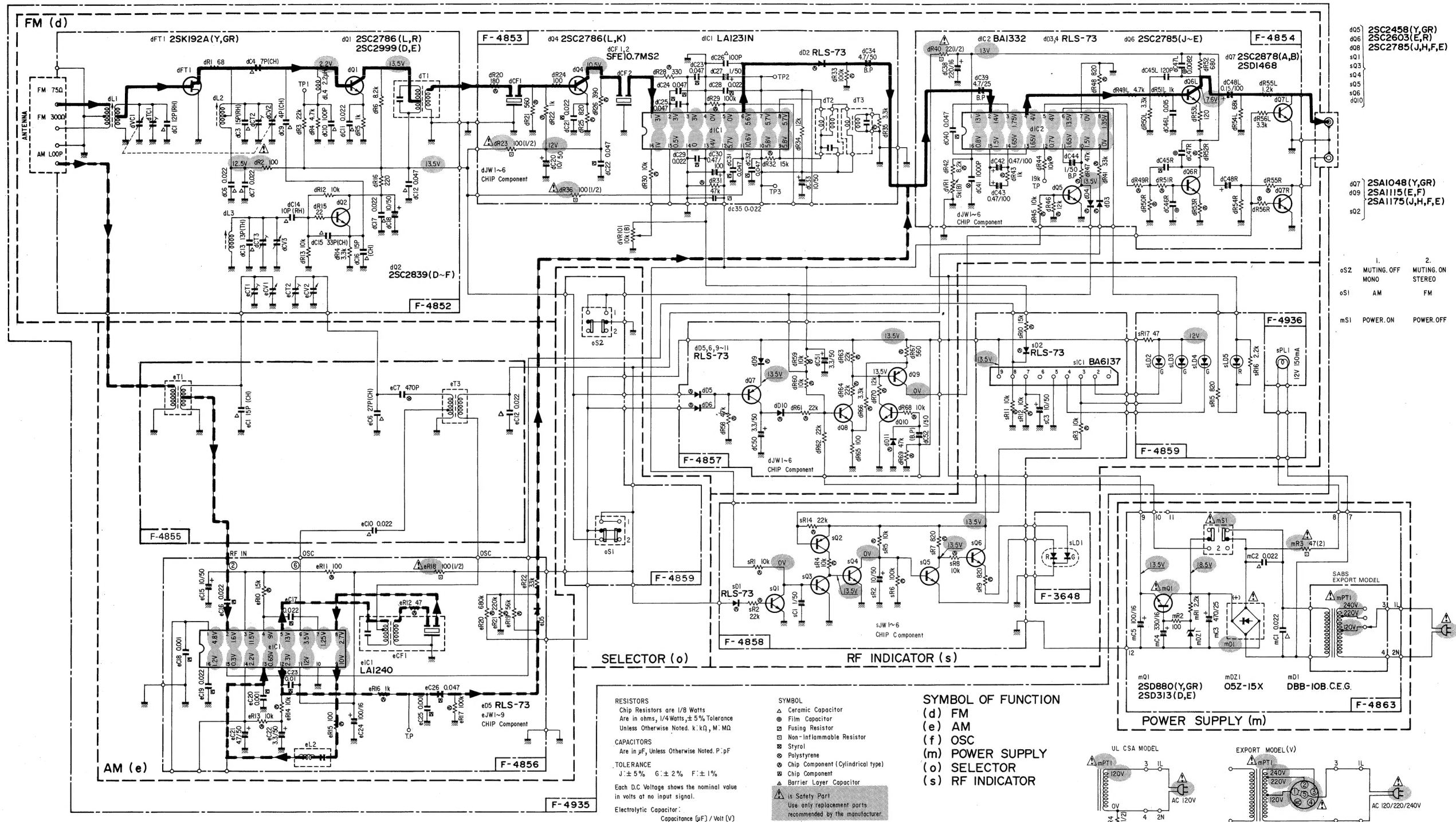
#### Parts List < Top View >

Parts No.	Stock No.	Description
1	47831100	AC Cord Cover
△ 2	38005400	Power Supply Cord (T-500 XX,XX-V,SA)
△	38004700	Power Supply Cord (T-500 UL,CSA)
△	07204200	Power Supply Cord (T-500 AS)
△	38004500	Power Supply Cord (T-500L EU)
△	38004300	Power Supply Cord (T-500L BS)
△ 3	15008101	Power Transformer (T-500 XX,SA)
△	15020809	Power Transformer (T-500 XX-V)
△	15008102	Power Transformer (T-500 UL,CSA)
△	15008105	Power Transformer (T-500 AS, T-500L EU)
△	15020806	Power Transformer (T-500L BS)
△ 4	48175200	Voltage Selector (T-500 XX-V)
△	07204700	Slide SW., VOLTAGE SELECTOR (T-500L EU,BS)
5	46438100	2P Terminal, OUTPUT
6	46547300	4P Terminal, ANTENNA
7	22301510	Ground Terminal



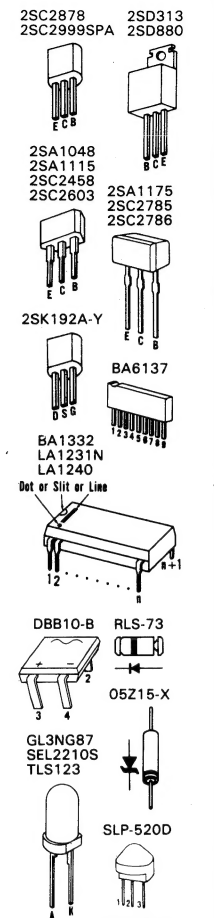
## 6. SCHEMATIC DIAGRAM 6-1. T-500

\* Design and specifications subject to change without notice for improvement.  
 \* La présentation et les spécifications sont susceptibles d'être modifiées sans préavis par suites d'améliorations éventuelles.  
 \* Änderungen, die dem technischen Fortschritt dienen, bleiben vorbehalten.



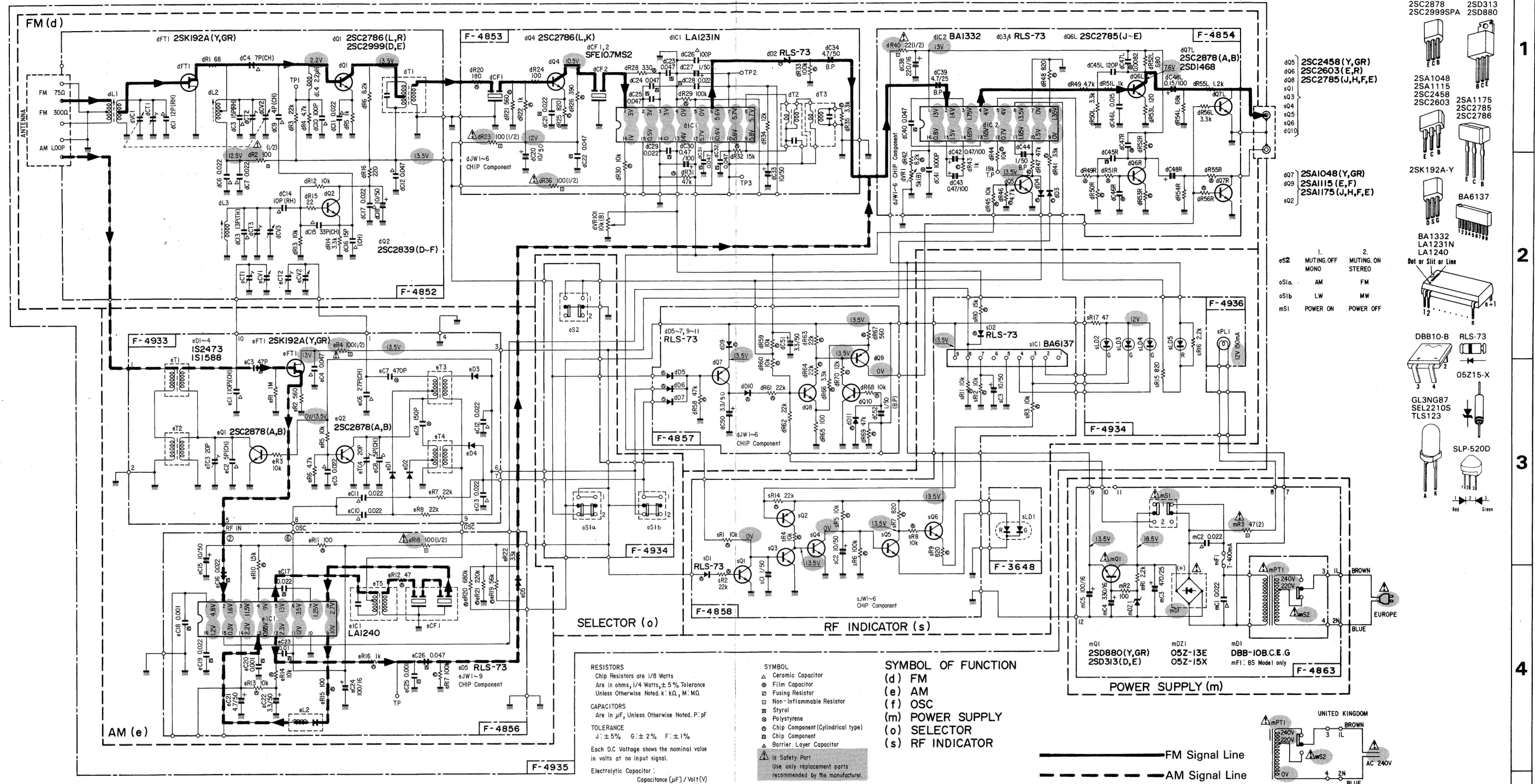
Note: In EXPORT MODEL, there exist some units with F-4855 board.

— FM Signal Line  
 - - - AM Signal Line



## 6-2. T-500L

- \* Design and specifications subject to change without notice for improvement.
- \* La présentation et les spécifications sont susceptibles d'être modifiées sans préavis par suites d'améliorations éventuelles.
- \* Änderungen, die dem technischen Fortschritt dienen, bleiben vorbehalten.



## 7. THREADING OF DIAL CORD

- If a dial cord is cut off or slip; replace it by following procedures.  
As this unit uses 0.5 mm  $\phi$  cord, please replace it with the same type certainly.

### 7-1. Threading of Dial Cord

Thread the dial cord in numerical order from ① to ⑭ as Fig. 7-1.

- Close the variable capacitor completely.

Fig. 7-1

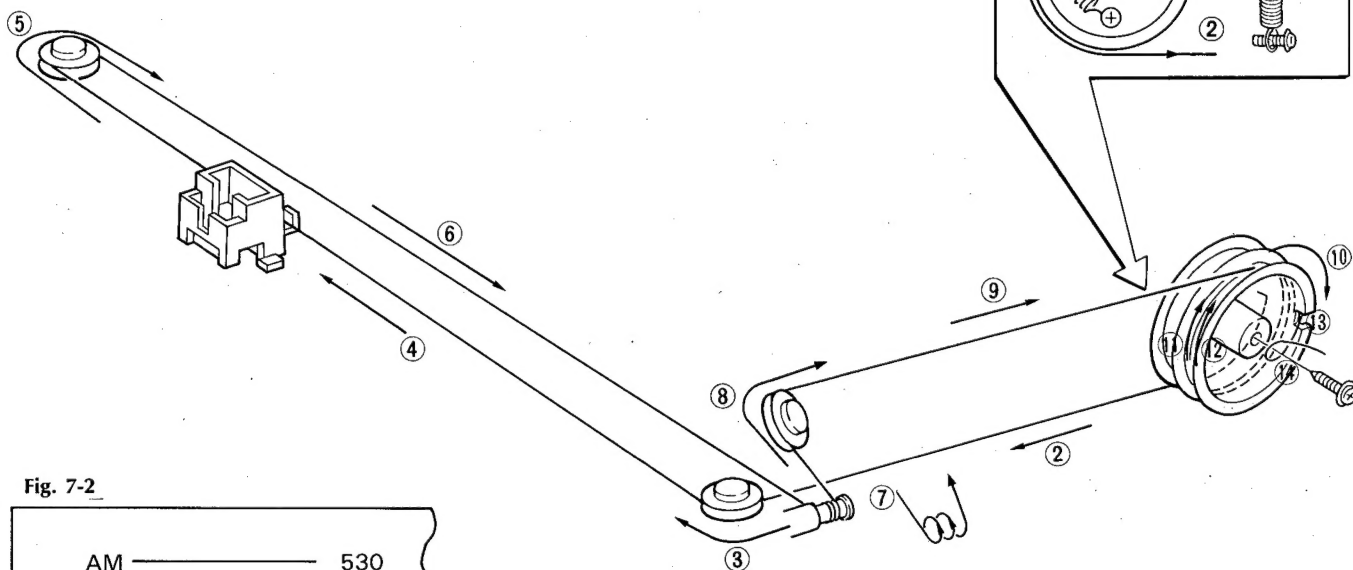
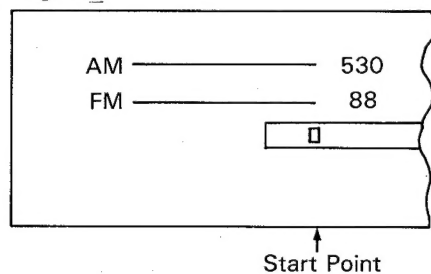


Fig. 7-2



### 7-2. Attachment of Dial Pointer

1. Close the variable capacitor completely.
2. Set the dial pointer to the start point, the line at the left end of the dial scale. (Fig. 7-2)

\* Confirm that the dial pointer runs smoothly on the dial scale by turning the tuning shaft.

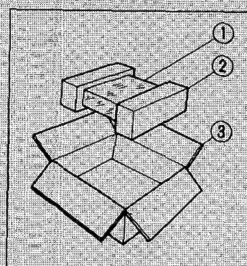
#### Parts List

Stock No.	Description
60360530	0.5mm $\phi$ Dial Cord
47747400	Dial Pointer Holder
07955700	D35 Pulley



## 8. PACKING LIST

Parts No.	Stock No.	Description
1	47859300	Vinyl Bag
2	07965300	Styrofoam Packing
3	47765100	Carton Case (T-500 Silver Model XX,UL,CSA,SA,AS)
	47765300	Carton Case (T-500 Silver Model XX-V)
	47765200	Carton Case (T-500 Black Model XX,UL,CSA,SA,AS)
	47765400	Carton Case (T-500 Black Model XX-V)
	47765500	Carton Case (T-500L Silver Model)
	47765600	Carton Case (T-500L Black Model)



## 9. ACCESSORY LIST

Stock No.	Description
38103200	PJP Cord
46051700	FM Antenna
46145700	AM Loop Antenna
07563000	Holder, AM Loop Antenna
46966200	Operating Instruction (T-500)
46967100	Operating Instruction (T-500L)



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 SANSUI ELECTRONICS (U.K.) LTD.  
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